

Link Aggregating In-Line Tap Summary Information See the User Guide for detailed specifications

MODEL	NETWORK PORTS	TAP PORTS	PASSIVE	RELAY FAILOVER	INJECTION	REDUNDANT POWER	SUPPORTS POE	RACK MOUNT
ATAP-100	10/100BASE-T	2 @ 10/100BASE-T	no	yes	yes	no	no	TAP-RMK-3 / TAP-RMK-14
ATAP-101	100BASE-T	2 @ 100BASE-T	yes	n/a	no	yes	yes	TAP-RMK-3 / TAP-RMK-14
ATAP-102	100BASE-T	2 @ 10/100BASE-T	yes	no	no	yes	yes	TAP-RMK-3 / TAP-RMK-14
ATAP-103	10/100BASE-T	2 @ 100BASE-T	no	yes	yes	no	no	TAP-RMK-3 / TAP-RMK-14
ATAP-GIG-BT-BT	10/100/1000BASE-T	2 @ 10/100/1000BASE-T	no	yes	yes	yes	no	TAP-RMK-2
ATAP-GIG-BT-SX	10/100/1000BASE-T	2 @ 1000BASE-SX LC	no	yes	yes	yes	no	TAP-RMK-2
ATAP-GIG-SX-BT	1000BASE-SX	2 @ 1000BASE-T	yes [MM splitter]	n/a	no	yes	n/a	TAP-RMK-2
ATAP-GIG-SX-SX	1000BASE-SX	2 @ 1000BASE-SX LC	yes [MM splitter]	n/a	no	yes	n/a	TAP-RMK-2
ATAP-GIG-LX-BT	1000BASE-LX	2 @ 1000BASE-T	yes [SM splitter]	n/a	no	yes	n/a	TAP-RMK-2
ATAP-2000-BT-BT	2 @ 10/100/1000BASE-T	2 @ 10/100/1000BASE-T	no	yes	yes	yes	no	TAP-RMK-2
ATAP-2000-SX-SX	2 @ 1000BASE-SX LC	2 @ 1000BASE-SX LC	yes [MM splitter]	n/a	no	yes	n/a	TAP-RMK-2
ATAP-2000-LX-SX	2 @ 1000BASE-LX LC	2 @ 1000BASE-SX LC	yes [SM splitter]	n/a	no	yes	n/a	TAP-RMK-2
ATAP-2001-BT-BT	2 @ 1000BASE-T	2 @ 1000BASE-T	no	yes	no	yes	no	TAP-RMK-2

Unpacking

UNIVERSAL PACKING LIST

- (1) Link Aggregating In-Line Tap (see models below)
- (2) Switching AC Adapters
- (1) Quick Installation Guide
- (1) User’s Guide
- (2) AC Power Cords* (for power redundancy)
 - * (1) AC Power Cord for ATAP-100 and ATAP-103

ATAP-100 SERIES MODELS

ATAP-100	ATAP-102
ATAP-101	ATAP-103

ATAP-GIG SERIES MODELS

ATAP-GIG-BT-BT	ATAP-GIG-SX-BT
ATAP-GIG-SX-SX	ATAP-GIG-BT-SX
ATAP-GIG-LX-BT	

ATAP-2000 SERIES MODELS

ATAP-2000-BT-BT	ATAP-2000-LX-SX
ATAP-2000-SX-SX	ATAP-2001-BT-BT

INTRODUCTION

The Link Aggregating In-Line Taps in this guide are typically installed between two network end-point devices: server and switch; two switches; or router and switch. For information on devices that are designed to connect with unidirectional data streams, such as SPAN ports, refer to the Fluke Networks line of Link Aggregating SPAN Taps.

Link Aggregating In-Line Taps:

- Flawlessly combine the separate streams of a full-duplex link
- Provide two identical tap ports for easy 24x7 scrutiny with multiple single NIC monitoring devices
- Eliminate link access and SPAN port contention
- Are non-intrusive and fault-tolerant; if power is lost, network traffic continues to flow
- Allow the monitoring of redundant links using a single analyzer

RACK INSTALLATION METHODS

Prior to installation, refer to the table above to determine which Rack Mounting Kits are compatible with the included thumbscrew mounting bracket on your Link Aggregating In-Line Tap.



Figure 1. ATAP-100 series tap units shown mounted in optional 3-bay (TAP-RMK-3) Rack Mounting Kit.

General Installation Notes

This quick reference guide is abbreviated for proficient network technicians; detailed installation information on each model is found in the User Guide.

NOTE
End-device LINK LEDs must indicate **“LINK”** prior to powering the tap to ensure correct failsafe tap functionality during loss of power.

1. Connect one of the network cables to the **NETWORK A** port.

IMPORTANT
Do not exceed the maximum length between end points as specified by the media type being used.

2. Connect the other network cable to the **NETWORK B** port.

The network is bi-directional Tx/Rx path sensitive. Both end-device **“LINK”** LEDs must be illuminated to indicate correct connection.

NOTE
If **“LINK”** does not exist, the network connection is backwards. Reverse **NETWORK A** and **NETWORK B** connections to establish **“LINK”**.

NOTE
ATAP-100 series only: Network devices that **do not** automatically negotiate Rx/Tx pin-out differences between devices to establish link typically require a crossover cable. If needed, connect the crossover cable as follows:

EQUIPMENT – EQUIPMENT	CROSSOVER CABLE CONNECTION
PC – PC	B
PC/ROUTER – SWITCH	none
SWITCH – SWITCH	A

3. Two power supplies are provided (except for ATAP-100 and ATAP-103 models). Use both power supplies to ensure uninterrupted monitoring. Connect both power supply barrel connectors into the **POWER 1** and **2** ports, respectively, of the Aggregated In-Line Tap. Plug the power supplies into the external power source; connect the second power supply to a different external power source circuit than the first power supply to eliminate power as a single point of failure. The **POWER 1** and **2** LEDs illuminate, indicating power 1 and 2, respectively, are on. Either LED not illuminated indicates a defective power source; replace immediately to ensure redundant power integrity.
4. Connect one tap cable from the **TAP 1** port connector into the monitoring device NIC. The **TAP 1 LINK** LED illuminates, indicating link has been established between the TAP 1 connector and IDS monitoring NIC. The **TAP 1 ACT** LED illuminates as data is passed to the TAP 1 device.

NOTE
For **NETWORK** or **TAP** BASE-T connectors, integrated LEDs display line status and speed of each port. Refer to the LED Display Codes table.

5. Connect the other tap cable from the **TAP 2** port connector into the analyzer monitoring NIC. The **TAP 2 LINK** LED illuminates, indicating link has been established between the TAP 2 connector and analyzer monitoring NIC. The **TAP 2 ACT** LED illuminates as data is passed to the TAP 2 analyzer.

LED DISPLAY CODES integrated on RJ45 ports

CODE	LEFT LED	with link or data RIGHT LED	CODE
LINK	solid green	green	1,000Mbps
DATA	flashing green	orange	100Mbps
N/A	n/a	[off]	10Mbps

ATAP-100 SERIES INSTALLATION

Refer to **Figure 2** below for connecting an ATAP-100 series Aggregating In-Line Tap to the network.

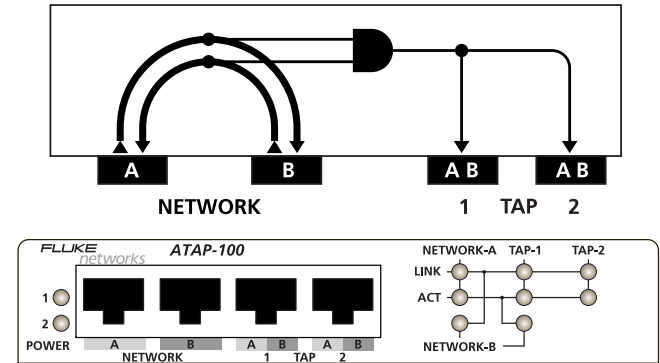


Figure 2. ATAP-100 series Aggregating Tap functional diagram

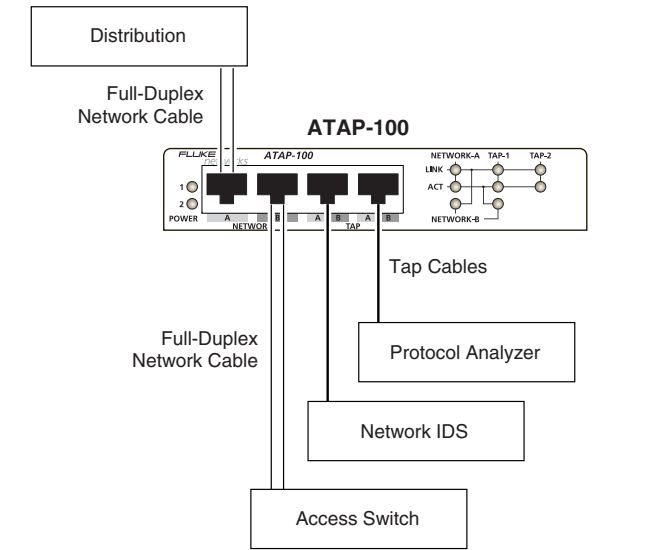


Figure 3. ATAP-100 series simple connectivity diagram

ATAP-GIG SERIES INSTALLATION

To connect an ATAP-GIG series Link Aggregating In-Line Tap, refer to the General Installation Notes as a guide.

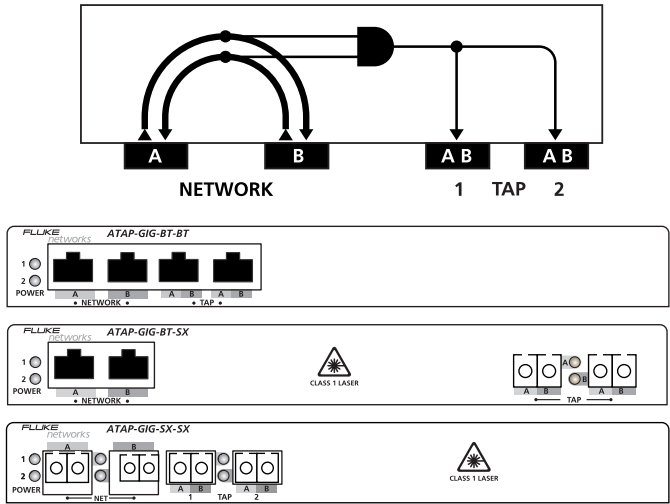


Figure 4. ATAP-GIG series network-tap simple functional diagram

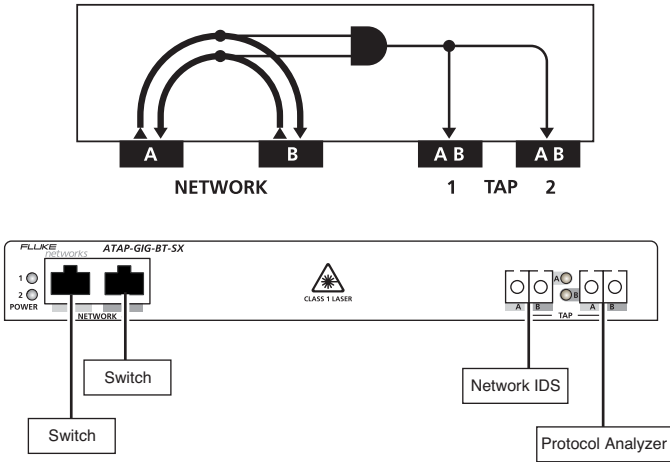


Figure 5. ATAP-GIG series tap-network functional diagram and simple connectivity reference example

ATAP-2000 SERIES INSTALLATION

To connect an ATAP-2000 series Link Aggregating In-Line Tap, refer to these General Installation Notes as a guide, in addition to the following notes:

- 1. Connect one of the primary link network cables to the **NETWORK A1** port. Connect the other primary link network cable to the **NETWORK A2** port.
- 2. Connect one of the secondary link network cables to the **NETWORK B1** port. Connect the other secondary link network cable to the **NETWORK B2** port.

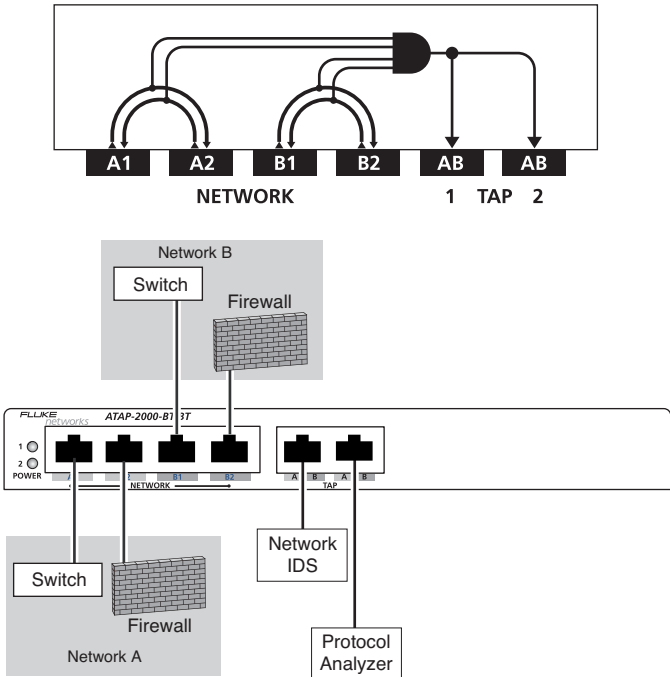


Figure 6. ATAP-2000 series functional diagram and simple connectivity reference example

COMPLIANCE TESTING

CAUTION

Changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

CE CERTIFICATIONS

This equipment has been tested and found to meet the radiated and conducted emission limits for a **Class B** product of **EN 55022** to the **EMC Directive 89/336/EEC** requirements.

This equipment has been tested and found to meet the immunity levels for **Class 1**, tested to **level 2** for **EN 6100-4-2**, tested to **level 3** for **EN 61000-4-3**, tested to **level 2** for **EN 61000-4-4**, and tested to **level 3** for **EN 61000-4-5** to the **EN 50082-1** requirements and meets the **Class A** requirements for **EN 61000-3-2** and **EN 61000-3-3**.

This equipment has completed the Product Safety Review and found to meet the **Low Voltage Directive 72/23/EEC (1993)** requirements.

CONTACTING FLUKE NETWORKS

Visit the Fluke Networks website at <http://www.flukenetworks.com/>.

Send email to: support@flukenetworks.com.

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- Singapore: +65-6738-5655
- Anywhere in the world: +1-425-446-4519

Visit our website for a complete list of phone numbers.



Link Aggregating In-Line Taps

ATAP-100 SERIES

ATAP-GIG SERIES

ATAP-2000 SERIES

QUICK INSTALLATION GUIDE

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